THE POPULATION IMPLOSION

Be careful what you wish for. After decades of struggling to contain the global population explosion that emerged from the healthcare revolution of the 20th century, the world confronts an unfamiliar crisis: rapidly decreasing birthrates and declining life spans that might set back the progress of human development.

It may not be the first way we think of ourselves, but almost all of us alive today happen to be children of the "world population explosion"--the momentous demographic surge that overtook the planet during the course of the 20th century. Thanks to sweeping mortality declines, human numbers nearly quadrupled in just 100 years, leaping from about 1.6 or 1.7 billion in 1900 to about 6 billion in 2000.

This unprecedented demographic expansion came to be regarded as a "population problem," and in our modern era problems demand solutions. By century's end, a worldwide administrative apparatus--comprised of Western foundations and aid agencies, multilateral institutions, and Third World "population" ministries--had been erected for the express purpose of "stabilizing" world population and was vigorously pursuing an international antinatal policy, focusing on low-income areas where fertility levels remained relatively high.

To some of us, the wisdom of this crusade to depress birthrates around the world (and especially among the world's poorest) has always been elusive. But entirely apart from its arguable merit, the continuing preoccupation with high fertility and rapid population growth has left the international population policy community poorly prepared to comprehend (much less respond to) the demographic trends emerging around the world today--trends that are likely to transform the global population profile significantly over the coming generation. Simply put, the era of the worldwide "population explosion," the only demographic era within living memory, is coming to a close.

Continued global population growth, to be sure, is in the offing as far as the demographer's eye can see. It would take a cataclysm of biblical proportions to prevent an increase in human numbers between now and the year 2025. Yet global population growth can no longer be accurately described as "unprecedented." Despite the imprecision of up-to-the-minute estimates, both the pace and absolute magnitude of increases in human numbers are markedly lower today than they were just a few years ago. Even more substantial decelerations of global population growth all but surely await us in the decades immediately ahead.

In place of the population explosion, a new set of demographic trends--each historically unprecedented in its own right--is poised to reshape, and recast, the world's population profile over the coming quarter century. Three of these emerging tendencies deserve special mention. The first is the spread of "subreplacement" fertility regimens, that is, patterns of childbearing that would eventually result, all else being equal, in indefinite population decline. The second is the aging of the world's population, a process that will be both rapid and extreme for many societies over the coming quarter century. The final tendency, perhaps the least appreciated of the three, is the eruption of intense and prolonged mortality crises, including brutal peacetime reversals in health conditions for countries that have already achieved relatively high levels of life expectancy.

For all the anxiety that the population explosion has engendered, it is hardly clear that

humanity will be better served by the dominant demographic forces of the post-populationexplosion era. Nobody in the world will be untouched by these trends, which will have a profound impact on employment rates, social safety nets, migration patterns, language, and education policies. In particular, the impact of acute and extended mortality setbacks is ominous. Universal and progressive peacetime improvements in health conditions were all but taken for granted in the demographic era that is now concluding; they no longer can be today, or in the era that lies ahead.

THE GLOBAL BABY BUST

In arithmetic terms, the 20th-century population explosion was the result of improvements in health and the expansion of life expectancy. Human life expectancy at birth is estimated to have doubled or more between 1900 and 2000, shooting up from approximately 30 years to nearly 65 years. Population growth rates accelerated radically thanks to the concomitant plunge in death rates. Despite tremendous population growth, rough calculations suggest that the world's population would be over 50 percent larger today in the absence of any other demographic changes.

The world's population currently totals about 6 billion, rather than 9 billion or more, because fertility patterns also changed over the course of the 20th century. And of all those diverse changes, without question the most significant was secular fertility decline: sustained and progressive reductions in family size due to deliberate birth control practices by prospective parents.

Within the full sweep of the human experience, secular fertility decline is very, very new. It apparently had not occurred in any human society until about two centuries ago in France. Since that beginning, secular fertility decline has spread steadily, if unevenly, embracing an ever rising fraction of the global population. In the final decades of the 20th century, subreplacement fertility made especially commanding advances: According to estimates and projections by the U.S. Census Bureau and the United Nations Population Division, fertility levels for the world as a whole fell by more than 40 percent between the early 1950s and the end of the century--a drop equivalent to over two births per woman per lifetime.

Indeed, subreplacement fertility has suddenly come amazingly close to describing the norm for childbearing the world over. In all, 83 countries and territories are thought to exhibit below-replacement fertility patterns today [see map]. The total number of persons inhabiting those countries is estimated at nearly 2.7 billion, roughly 44 percent of the world's total population.

Secular fertility decline originated in Europe, and virtually every population in the world that can be described as of European origin today reports fertility rates below the replacement level. But these countries and territories today currently account for only about a billion of the over 2.5 billion people living in "subreplacement regions." Below-replacement fertility is thus no longer an exclusively--nor even a predominantly--European phenomenon. In the Western Hemisphere, Barbados, Cuba, and Guadeloupe are among the Caribbean locales with fertility rates thought to be lower than that of the United States. Tunisia, Lebanon, and Sri Lanka have likewise joined the ranks of subreplacement fertility societies.

The largest concentration of subreplacement populations, however, is in East Asia. The first non-European society to report subreplacement fertility during times of peace and order was Japan, whose fertility rate fell below replacement in the late 1950s and has remained there almost continuously for the last four decades. In addition to Japan, all four East Asian tigers--Hong Kong, the Republic of Korea, Singapore, and Taiwan--have reported subreplacement fertility levels since at least the early 1980s. By far the largest subreplacement population is in

China, where the government's stringent antinatal population control campaign is entering its third decade.

The singularity of the Chinese experience, however, should not divert attention from the breadth and scale of fertility declines that have been taking place in other low-income settings. A large portion of humanity today lives in countries where fertility rates are still above the net replacement level, but where secular fertility decline is proceeding at a remarkably rapid pace.

A glance at the 15 most populous developing countries illustrates the magnitude of fertility change over the last quarter century [see graphs]. These countries account for about three quarters of the current population of the "less developed regions," and three fifths of the total world population. In addition to China, Thailand is believed to be below the replacement level. Three other countries (Brazil, Iran, and Turkey) are thought to be just barely above the replacement level. Another four (Bangladesh, Indonesia, Mexico, and Vietnam) are slightly higher. Today, in other words, nine of the 15 largest developing countries are believed to register fertility levels lower than those that characterized the United States as recently as 1965. And over the last quarter century, fertility decline in this set of countries has been pronounced: In eight of those 15, fertility dropped by over half.

The regions where fertility levels remain highest, and where fertility declines to date have been most modest, are sub-Saharan Africa and the Islamic expanse to its north and east--more specifically, the Middle East. Those areas encompassed a total population of about 900 million in 2000, less than a fifth of the estimated total for less developed regions, and a bit under a seventh of the world total. Even for this grouping, however, the image of uniformly high "traditional" fertility patterns is already badly outdated. A revolution in family formation patterns has begun to pass through these regions. In 2000, in fact, the overall fertility level for North Africa--the territory stretching from Western Sahara to Egypt--was lower than the U.S. level of the early 1960s. Perhaps even more surprisingly, secular fertility decline appears to be unambiguously in progress in a number of countries in sub-Saharan Africa. For instance, Kenya's total fertility rate is believed to have dropped by almost four births per woman over the past 20 years.

The remarkable particulars of today's global march toward smaller family size fly in the face of many prevailing assumptions about when rapid fertility decline can, and cannot, occur. Poverty and illiteracy (especially female illiteracy) are widely regarded as impediments to fertility decline. Yet, very low income levels and very high incidences of female illiteracy have not prevented Bangladesh from more than halving its total fertility rate during the last quarter century. By the same token, strict and traditional religious attitudes are commonly regarded as a barrier against the transition from high to low fertility. Yet over the past two decades, Iran, under the tight rule of a militantly Islamic clerisy, has slashed its fertility level by fully two-thirds and now apparently stands on the verge of subreplacement.

For many population policymakers, it has been practically an article of faith that a national population program is instrumental, if not utterly indispensable, to fertility decline in a low-income setting. Iran, for instance, achieved its radical reductions under the auspices of a national family planning program. (In 1989, after vigorous doctrinal gymnastics, the mullahs in Tehran determined that a state birth control policy would indeed be consistent with the Prophet's teachings.) But other countries have proven notable exceptions. Brazil has never adopted a national family planning program, yet its fertility levels have declined by well over 50 percent in just the last 25 years.

What accounts for the worldwide plunge in fertility now underway? The honest and entirely unsatisfying answer is that nobody really knows--at least, with any degree of confidence and precision. The roster of contemporary countries caught up in rapid fertility decline is striking for

the absence of broad, obvious, and identifiable socioeconomic thresholds or common preconditions. (Reviewing the evidence from the last half century, the strongest single predictor for any given low-income country's fertility level is the calendar year: The later the year, the lower that level is likely to be.) If you can find the shared, underlying determinants of fertility decline in such disparate countries as the United States, Brazil, Sri Lanka, Thailand, and Tunisia, then your Nobel Prize is in the mail.

Two points, however, can be made with certainty. First, the worldwide drop in childbearing reflects, and is driven by, dramatic changes in desired family size. (Although even this observation only raises the question of why personal attitudes about these major life decisions should be changing so commonly in so many disparate and diverse locales around the world today.) Second, it is time to discard the common assumption, long championed by demographers, that no country has been modernized without first making the transition to low levels of mortality and fertility. The definition of "modernization" must now be sufficiently elastic to stretch around cases like Bangladesh and Iran, where very low levels of income, high incidences of extreme poverty, mass illiteracy, and other ostensibly "nonmodern" social or cultural features are the local norm, and where massive voluntary reductions in fertility have nevertheless taken place.

SEND YOUR HUDDLED MASSES ASAP

Barring catastrophe, the world's total population can be expected to grow substantially over the coming quarter century: U.S. Census Bureau projections for 2025 would place global population at over 7.8 billion, almost 30 percent larger than today. Yet, due to declining fertility, population growth is poised to decelerate markedly over the coming generation. The projected annual rate of world population growth in 2025 is just under 0.8 percent, considerably slower than the current projected rate of 1.3 percent, and far below the estimated 2.0 percent annual growth rate of the late 1960s. The great global birth wave will have crested and begun ebbing by 2025. In fact, by those projections, slightly fewer babies will be born worldwide in the year 2025 than in any year over the previous four decades.

The prospective pace of population growth for the different regions of the world is highly uneven over the coming generation [see table]. The most dramatic increases will occur in sub-Saharan Africa, followed by countries in North Africa and the Middle East. By 2025 more people may be living in Africa than in all of today's "more developed countries" taken together.

The natural growth of population in the more developed countries has essentially ceased. The overall increase in population for 2000 in these nations is estimated at 3.3 million people, or less than 0.3 percent. Two thirds of that increase, however, is due to immigration; the total "natural increase" amounts to just over 1 million. Over the coming quarter century, in the U.S. Census Bureau's projections, natural increase adds only about 7 million people to the total population of the more developed countries. And after the year 2017, deaths exceed births more or less indefinitely. Once that happens, only immigration on a scale larger than any in the recent past can forestall population decline. (The specter of population decline in more developed countries looms even larger if the United States, with its relatively high fertility level and relatively robust inflows of immigrants, is taken out of the picture. Excluding the United States, total deaths already exceed total births by almost half a million a year.)

For Europe as a whole (including Russia), the calculated long-term volume of immigration required to avert overall population decline is nearly double the recent annual level--an average of 1.8 million net newcomers a year, versus the roughly one million net entrants a year in the late 1990s. To prevent an eventual decline in the size of the 15 to 64 grouping (often termed the "working-age" population), Europe's net migration will have to nearly

quadruple to a long-term average of about 3.6 million a year. Migration of this magnitude would change the face of Europe: By 2050, under these two scenarios, the descendants of present-day non-Europeans will account for approximately 20 to 25 percent of Europe's inhabitants.

Even more dramatic are the prospects for Japan, where current net migration levels are close to zero. To maintain total population size, Japan would have to accept a long-term average of almost 350,000 newcomers a year for the next 50 years, and it would need nearly twice that number to keep its working-age population from shrinking. Under the first contingency, over a sixth of Japan's 2050 population would be descendants of present-day gaijin (foreigners); under the second contingency, that group would account for nearly a third of Japan's total population.

Europe and Japan will not lack immigration candidates in the years ahead. If Europe's needed immigration flows continue to come largely from North Africa, the Middle East, sub-Saharan Africa, and South Asia, those migrants will account for only about 3 to 7 percent of the population growth in their home countries. By the same token if Japan, for reasons of history and affinity, relies upon China and Southeast Asia for all its new national recruits, it will require just 2 to 4 percent of those countries' total envisioned population increase over the next 25 years. And as long as a huge income gap separates these more developed and less developed locales, there will be a compelling motive for such migration.

The issue clearly will not be supply, but rather demand. Will Western countries facing population decline opt to let in enough outsiders to stabilize their domestic population levels? Major and sustained immigration flows will entail correspondingly consequential long-term changes in a country's ethnic composition, with accompanying social alterations and adjustments. Such inflows will also require a capability to assimilate newcomers, so that erstwhile foreigners (and their descendants) can become true members of their new and chosen society.

The current outlook for "replacement migration" varies dramatically within the more developed regions. Throughout Europe, vocal (but still marginal) antiforeign political movements have taken the stage in recent years, while more tolerant sectors of the public have worried about the impact of immigration on their welfare states. Yet the continent, populated as it has been by successive historical flows of peoples, possesses traditions and capacities of assimilation that are not always fully appreciated.

The situation looks very different for Japan, where no major influxes of newcomers have been recorded over the past thousand years, and where the delicate distinctness of the Japanese minzoku (race) is a matter of intense, if not always enunciated, public consciousness. Despite reforms in Japanese immigration laws, a community of ethnic Koreans in Japan-many of them fourth-generation residents of the country--still does not enjoy Japanese citizenship. Indeed, Japan naturalizes fewer foreigners each year than tiny Switzerland.

It is extraordinarily difficult to imagine any circumstances under which the Japanese public might acquiesce in "replacement migration." Socially and politically, long-term demographic decline seems likely to be a much more acceptable alternative. But these are the only two choices, and over the coming decades all the more developed countries must decide between them. For all societies with long-term fertility rates significantly below the replacement level, the only alternative to an eventual decline of the total population--or of key age groups within that total population--is steady and massively enhanced immigration.

A GRAY WORLD

The world's population is set to age markedly over the coming generation: The longevity revolution of the 20th century has foreordained as much. The tempo of social aging, however, has been accelerated in many countries by extremely low levels of fertility. In 2025, there will likely remain a few pockets of the world in which populations will remain as youthful as those from earlier historical epochs. For example, the median age in sub-Saharan Africa in 2025 will be just 20 years, that is, as many people would be under 20 as over 20. (Such a profile probably characterized humanity from the Neolithic era up until the Industrial Revolution.) Throughout the rest of the world, however, the phenomenon of aging will transform the structure of national populations, often acutely.

Population aging will be most pronounced in today's more developed countries. By the U.S. Census Bureau's estimates, the median age for this group of countries today is about 37 years. In 2025, the projected median age will be 43.

Due to its relatively high levels of fertility and immigration (immigrants tend to be young), the population of the United States is slated to age more slowly than the rest of the developed world. By 2025, median age in the United States will remain under 39 years. For the rest of the developed world, minus the United States, median age will be approximately 45 years. And for a number of countries, the aging process will be even further advanced [see table].

In Germany, for example, the projected median age in the year 2025 is 46. Greece and Bulgaria are both ascribed median ages in excess of 47. Japan would have a median age of over 49. In this future Japan, more than a fifth of the citizenry would be over 70 years of age, and nearly one person in six would be 75 or older. In fact, persons 75 and older would outnumber children under 15 years of age.

Population aging, of course, will also occur in today's less developed regions. Current developed countries grew rich before they grew old; many of today's low-income countries, by contrast, look likely to become old first. One of the most arresting cases of population aging in the developing world is set to unfold in China, where relatively high levels of life expectancy, together with fertility levels suppressed by the government's resolute and radical population control policies, are transforming the country's population structure. Between 2000 and 2025, China's median age is projected to jump by almost 9 years. This future China would have one-sixth fewer children than contemporary China, and the 65-plus population would surge by over 120 percent, to almost 200 million. These senior citizens would account for nearly a seventh of China's total population.

Caring for the elderly will inexorably become a more pressing issue for China under such circumstances, but nothing remotely resembling a national pension system is yet in place in that country. Even with rapid growth over the next quarter century, China will still be a poor country in 2025. Coping with its impending aging problem promises to be an immense social and economic issue for this rising power.

DEATH MAKES A COMEBACK

Given the extraordinary impact of the 20th century's global health revolution, well-informed citizens around the world have come to expect steady and progressive improvement in life expectancies and health conditions during times of peace.

Unfortunately, troubling new trends challenge these happy presumptions. A growing fraction

of the world's population is coming under the grip of peacetime retrogressions in health conditions and mortality levels. Long-term stagnation or even decline in life expectancy is now a real possibility for urbanized, educated countries not at war. Severe and prolonged collapses of local health conditions during peacetime, furthermore, is no longer a purely theoretical eventuality. As we look toward 2025, we must consider the unpleasant likelihood that a large and growing fraction of humanity may be separated from the planetary march toward better health and subjected instead to brutal mortality crises of indeterminate duration.

In the early post-World War II era, the upsurge in life expectancy was a worldwide phenomenon. By the reckoning of the U.N. Population Division, in fact, not a single spot on the globe had a lower life expectancy in the early 1970s than in the early 1950s. And in the late 1970s only two places on earth--Khmer Rouge-ravaged Cambodia and brutally occupied East Timor--had lower levels of life expectancy than 20 years earlier. In subsequent years, however, a number of countries unaffected by domestic disturbance and upheaval began to report lower levels of life expectancy than they had known two decades earlier. Today that list is long and growing. U.S. Census Bureau projections list 39 countries in which life expectancy at birth is anticipated to be at least slightly lower in 2010 than it was in 1990. With populations today totaling three quarters of a billion people and accounting for one eighth of the world's population, these countries are strikingly diverse in terms of location, history, and material attainment.

This grouping includes the South American countries of Brazil and Guyana; the Caribbean islands of Grenada and the Bahamas; the Micronesian state of Nauru; 10 of the 15 republics of the former Soviet Union; and 23 sub-Saharan African nations. As might be surmised from the heterogeneity of these societies, health decline and mortality shocks in the contemporary world are not explained by a single set of factors, but instead by several syndromes working simultaneously in different parts of the world to subvert health progress.

Russia has experienced a prolonged stagnation and even decline in life expectancy, and its condition illuminates the problems facing some of the other former Soviet republics [see graph]. After recording rapid postwar reductions in mortality in the 1950s, Russian mortality levels stopped falling in the 1960s and began rising for broad groups of the population. By 1990, overall life expectancy at birth in Russia was barely as high as it had been 25 years earlier. With the end of communist rule in 1991, Russia suffered sudden and severe declines in mortality, from which it has not yet fully recovered. By 1999, overall life expectancy at birth in Russia had regressed to the point where it had been four decades earlier.

Although many aspects of Russia's continuing health crisis remain puzzling, it appears that lifestyle and behavioral risks--including heavy smoking and extremely heavy drinking--figure centrally in the shortening of Russian lives. A weak and rudderless public health system, combined with apparent indifference in Moscow to the nation's ongoing mortality crisis, also compromises health progress. Although Russia is an industrialized society with an educated population and a large indigenous scientific-technical cadre, such characteristics do not automatically protect a country from the sorts of health woes that have befallen the Russian Federation.

In sub-Saharan Africa, a different dynamic drives mortality crises: the explosive spread of the HIV/AIDS epidemic. In its most recent report, the Joint United Nations Programme on HIV/AIDS (UNAIDS) estimated that 2.8 million died of AIDS in 1999, 2.2 million in sub-Saharan Africa alone. UNAIDS also reported that almost 9 percent of the region's adult population is already infected with the disease. By all indications, the epidemic is still spreading in sub-Saharan Africa. As of 2000, UNAIDS projected that in several sub-Saharan countries, a 15-year-old boy today faces a greater than 50 percent chance of ultimately dying

from AIDS--even if the risk of becoming infected were reduced to half of current levels.

Given sub-Saharan Africa's disappointing developmental performance and conspicuously poor record of governance over the post-independence period, the pervasive failure in this low-income area to contain a deadly but preventable contagion may seem tragic but unsurprising. Yet it is worth noting that the AIDS epidemic appears to have been especially devastating in one of Africa's most highly developed and best-governed countries: Botswana.

Unlike most of the region, Botswana is predominantly urbanized; its rate of adult illiteracy is among the subcontinent's very lowest; and over a generation in which sub-Saharan economic growth rates were typically negative, Botswana's was consistently positive. Yet despite such promising statistics, Botswana's population has been decimated by HIV/AIDS over the last decade. Between 1990 and 2000, life expectancy in Botswana plummeted from about 64 years to about 39 years, that is to say, by almost a quarter century. Recent projections for 2025 envision a life expectancy of a mere 33 years. If this projection proves accurate, Botswana will have a much lower life expectancy 25 years from now than it had nearly half a century ago.

One of the disturbing facets of the Botswanan case is the speed and severity with which life expectancy projections have been revised downward. Assuming most recent figures are accurate, as recently as 1994 expert demographers were overestimating Botswana's life expectancy for 2000 by about 30 years. Such abrupt and radical revisions raise the question of whether similar brutal adjustments await other sub-Saharan countries--or, for that matter, countries in other regions of the world. This question cannot be answered with any degree of certainty today, but we would be unwise to dismiss it from consideration. HIV/AIDS may not be the only plague capable of wrenching down national levels of life expectancy over the coming quarter century. Twenty-five years ago, HIV/AIDS had not even been identified and diagnosed.

Surprisingly, sub-Saharan Africa's AIDS catastrophe is not projected to alter the region's population totals dramatically. That speaks to the extraordinary power of high fertility levels. Given the region's current and prospective patterns of childbearing, the subcontinent's population totals in 2025 may prove to be unexpectedly insensitive to the scope or scale of the disasters looming ahead. Yet it is the mortality patterns that will do much to define the quality of life for those human numbers--and to circumscribe their economic and social potential.

THE SHAPE OF THINGS TO COME

Looking toward 2025, we must remember that many 20th-century population forecasts and demographic assessments proved famously wrong. Depression-era demographers, for example, incorrectly predicted depopulation for Europe by the 1960s and completely missed the "baby boom." The 1960s and 1970s saw dire warnings that the "population explosion" would result in worldwide famine and immiseration, whereas today we live in the most prosperous era humanity has ever known. In any assessment of future world population trends and consequences, a measure of humility is clearly in order.

Given today's historically low death rates and birthrates, however, the arithmetic fact is that the great majority of people who will inhabit the world in 2025 are already alive. Only an apocalyptic disaster can change that. Consequently, this reality provides considerable insight into the shape of things to come. By these indications, indeed, we must now adapt our collective mind-set to face new demographic challenges.

A host of contradictory demographic trends and pressures will likely reshape the world during

the next quarter century. Lower fertility levels, for example, will simultaneously alter the logic of international migration flows and accelerate the aging of the global population. Social aging sets in motion an array of profound changes and challenges and demands far-reaching adjustments if those challenges are to be met successfully. But social aging is primarily a consequence of the longer lives that modern populations enjoy. And the longevity revolution, with its attendant enhancements of health conditions and individual capabilities, constitutes an unambiguous improvement in the human condition. Pronounced and prolonged mortality setbacks portend just the opposite: a diminution of human well-being, capabilities, and choices.

It is unlikely that our understanding of the determinants of fertility, or of the long-range prospects for fertility, will advance palpably in the decades immediately ahead. But if we wish to inhabit a world 25 years from now that is distinctly more humane than the one we know today, we would be well advised to marshal our attention to understanding, arresting, and overcoming the forces that are all too successfully pressing for higher levels of human mortality today.

Want To Know More?

Over the last two centuries, world population trends have been dominated by what is known as "the demographic transition": the progressive and seemingly inexorable shift in society after society from a regimen of high birthrates and death rates to one of low death and birthrates. One of the best introductions to this powerful, but still mysterious, phenomenon is Jean-Claude Chesnais's The Demographic Transition: Stages, Patterns, and Economic Implications (New York: Oxford University Press, 1992).

Detailed global population projections are available from a number of sources, but perhaps the two most authoritative of these are the U.S. Bureau of the Census and the United Nations Population Division (UNPD). The Census Bureau's latest outlook is available online through its International Data Base. The UNPD's projections are published biennially. The latest update, World Population Prospects: The 2000 Revisions (New York: UNPD, forthcoming) is due out shortly.

For a summary of what is currently known about the global contours and determinants of subreplacement fertility, read "Below Replacement Fertility," a double issue of the UNPD's Population Bulletin of the United Nations (Nos. 40/41, dated 1999 but published in 2000) that offers a collection of expert assessments. The economic and policy implications of social aging are examined in a series of publications and papers by the Organisation for Economic Cooperation and Development (OECD), including "Maintaining Prosperity in an Ageing Society" (Paris: OECD, 1998) and "Reforms for an Ageing Society" (Paris: OECD, 2000). The UNPD report Replacement Migration: Is It a Solution to Declining and Ageing Populations? (New York: UNPD, March 2000), available online, examines the potential of migration to forestall depopulation and social aging. Demetrios G. Papademetriou and Kimberly A. Hamilton argue that Japan must end its restrictive immigration policies if it is to ensure its place as a global leader in Reinventing Japan: Immigration's Role in Shaping Japan's Future (Washington: Carnegie Endowment for International Peace, 2000).

On health setbacks in Russia and other post-communist countries, see Nicholas Eberstadt's Prosperous Paupers and Other Population Problems (New Brunswick: Transaction Publishers, 2000) and "Russia: Too Sick To Matter?" (Policy Review, June/July 1999).

For links to relevant Web sites, as well as a comprehensive index of related Foreign Policy

articles, access www.foreignpolicy.com.

Where Have All the Children Gone?

83 countries and territories currently exhibit below-replacement fertility patterns.

Global fertility levels fell by more than 40 percent between the early 1950s and 2000.

Subreplacement fertility is the norm for roughly 44 percent of the world's population.

The Population Explosion Fizzles

Fertility Rates For Populous Low-Income Countries: 1875, 2000, 2015

Legend for Chart:

А

B - Projected midyear population in 2000

В

China	1261.8 million
India	1014.0 million
Indonesia	224.8 million
Brazil	172.9 million
Pakistan	141.6 million
Bangladesh	129.2 million
Nigeria	123.3 million
Mexico	100.3 million
Philippines	81.2 million
Vietnam	78.8 million
Egypt	68.4 million
Turkey	65.7 million
Iran	65.6 million
Ethiopia	64.1 million
Thailand	61.2 million

Source: U.S. Bureau of the Census, International Data Base: United Nations Population Division, World Population Prospects (New York: United Nations, 1998)

Note: 1975 rates interpolated from estimated 1970/75 and 1975/80 levels. 2000 and 2025 rates are projected.

Go Forth and Multiply

Population Projections from 2000

Legend for Chart:

A - Region
B - Projected Midyear 2000 Population (in millions)
C - Projected 2025 Population (in millions)
D - Absolute Change 2000-2025 (in millions)
E - Percent Change 2000-2025

В	С	D	E
6,080	7 , 841	1,761	29
1,186	1,239	53	4
4,895	6,602	1,707	35
661	1,071	410	62
145	203	58	40
171	280	109	64
3,444	4,387	943	27
520	671	151	29
	B 6,080 1,186 4,895 661 145 171 3,444 520	B C 6,080 7,841 1,186 1,239 4,895 6,602 661 1,071 145 203 171 280 3,444 4,387 520 671	B C D 6,080 7,841 1,761 1,186 1,239 53 4,895 6,602 1,707 661 1,071 410 145 203 58 171 280 109 3,444 4,387 943 520 671 151

Source: U.S. Bureau of the Census, International Data Base

This Old World

Percent of Population 65 and Above (Projected)

Legend for Chart:

A - Country B - 2000

C - 2025

A	В	С
Algeria	4.0	7.1
Brazil	5.3	11.3
China	7.0	13.5
Ethiopia	2.8	2.7
India	4.6	7.8
Iraq	3.1	4.3
Saudi Arabia	2.6	5.6
South Africa	4.8	9.6
Germany	16.2	23.1
Japan	17.0	27.6
Russia	12.6	18.5
Spain	16.9	23.5
United States	12.6	18.5

Source: U.S. Bureau of the Census, International Data Base

By Nicholas Eberstadt

Nicholas Eberstadt holds the Henry Wendt Chair in Political Economy at the American Enterprise Institute in Washington, D.C.

Copyright of **Foreign Policy** is the property of Foreign Policy. Copyright of PUBLICATION is the property of PUBLISHER. The copyright in an individual article may be maintained by the author in certain cases. Content may not be copied or emailed to multiple sites or posted to a listserv without the copyright holder's express written permission. However, users may print, download, or email articles for individual use.

Source: Foreign Policy, Mar/Apr2001 Issue 123, p42, 12p

©2006 EBSCO Publishing. Privacy Policy - Terms of Use - Copyright